I CLAIM:

1. In a backlit liquid crystal display which includes:

a first source of light; a matrix array of rows and columns of liquid crystal picture elements spacedly disposed from one side of the light source wherein each liquid crystal picture element comprises a pair of electrodes having liquid crystal material disposed therebetween; means for refracting light rays emanating from the light source to provide two similar images thereof, thereby enlarging the area effectively illuminated by the light source, whereby a bright, uniform light distribution is provided in a low profile assembly, the refracting means spacedly disposed between the light source and the matrix array; and means for diffusing light emanating from the light source operatively disposed between the refracting means and the matrix array, the improvement comprising:

a second source of light for night mode operation, spacedly disposed on the side of the first source of light opposite the matrix array, and switch means for selecting between day and night mode light sources.

2. The backlit liquid crystal display of Claim 1, wherein said second light source is a back reflector during day mode operation.

3. The backlit liquid crystal display of Claim 2, wherein said second light source is an electroluminescent panel.

4. The backlit liquid crystal display of Claim 1, wherein said refracting means includes a thin film having faceted prisms formed on one face thereof, wherein light rays are refracted by said facets to provide two similar images thereof.

5. The backlit liquid crystal display of Claim 4, wherein the distance between said two similar images is controlled by the operative spacing of said refracting means from said light source and wherein said spacing is such that said images are immediately adjacent one another.

6. The backlit liquid crystal display of Claim 1, wherein the liquid crystal display is an active matrix liquid crystal display.

7. The backlit liquid crystal display of Claim 1, wherein said refracting means is an integral image-splitting and collimating lens for providing two similar images of the light emanating from said source and for collimating the light.

8. The backlit liquid crystal display of Claim 7, further comprising an infrared light absorbing filter capable of preventing substantially all infrared light from being emitted from the display while at the same time transmitting substantially all red light therethrough, thereby to maintain the color integrity of the image of the display, the infrared light absorbing filter spacedly disposed between said integral image-splitting and collimating lens and said diffuser.

9. The backlit liquid crystal display of Claim 7, further comprising an infrared light absorbing filter capable of preventing substantially all infrared light from being emitted from the display while at the same time transmitting substantially all red light therethrough, thereby to maintain the color integrity of the image of the display, the infrared light absorbing filter spacedly disposed between said second source of light and said first source of light.

10. The backlit liquid crystal display of Claim 9, further including a second integral collimating and image-splitting means spacedly disposed between said infrared filter and said second source of light.

11. The backlit liquid crystal display of Claim 1, wherein the color integrity of the displayed image is

maintained throughout a viewing angle of about 0° - 30° from normal.

12. The backlit liquid crystal display of Claim 11, wherein said viewing angle is about 0° - 60° from normal.

13. The backlit liquid crystal display of Claim 1, wherein the LCD thickness is less than about 2 inches.

14. The backlit liquid crystal display of Claim 13, wherein the LCD thickness is about 1 inch.

15. The backlit liquid crystal display of Claim 1, having an RGB-triad color pattern.

16. The backlit liquid crystal display of Claim 15, which is a full-color, substantially uniformly lit AMLCD having NVIS-B NVG compatibility, and which exhibits red color coordinate integrity at viewing angles up to about 60° or more from the normal to the display surface.

17. The backlit liquid crystal display of Claim 16, which, when tested according to MIL-L-85762A Standard for color displays with 0.5 fl intensity, generally exhibits throughout the display an NRb of less than or equal to about 2.2E-09, with slightly higher numbers at the normal angle at the center of the display, and somewhat smaller numbers near the edges.

18. The backlit liquid crystal display of Claim 17, wherein the NVG compatibility includes compatibility with GEN-III NVGs.